

Datasheet: TZA006

Description:	HUMAN ANTI CEMIPILIMAB
Specificity:	CEMIPILIMAB
Other names:	Libtayo
Format:	Purified
Product Type:	Monoclonal Antibody
Clone:	AbD41947ad
Isotype:	HuCAL Fab monovalent
Quantity:	0.1 mg

Product Details

Applications

This product has been reported to work in the following applications. This information is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information. For general protocol recommendations, please visit www.bio-rad-antibodies.com/protocols.

	Yes	No	Not Determined	Suggested Dilution
ELISA	▪			

Where this product has not been tested for use in a particular technique this does not necessarily exclude its use in such procedures. Suggested working dilutions are given as a guide only. It is recommended that the user titrates the product for use in their own system using appropriate negative/positive controls.

Product Form

A monovalent human recombinant Fab (lambda light chain) selected from the HuCAL® phage display library. Expressed in a proprietary *E. coli* strain. The antibody is tagged with a DYKDDDDK tag, a SpyTag version 2 (VPTIVMVDAYKRYK) and a His6-tag (HHHHHH) at the C-terminus of the antibody heavy chain. This antibody is supplied as a liquid.

Preparation

Metal chelate affinity chromatography

Source

E. coli

Buffer Solution

Phosphate buffered saline

Preservative Stabilisers

0.1% ProClin 950

Approx. Protein Concentrations

Antibody concentration 0.5 mg/ml

Specificity

Human Anti-Cemiplimab Antibody, clone AbD41947ad is a paratope specific, inhibitory anti-idiotypic antibody that specifically recognizes the fully human monoclonal antibody cemiplimab. It does not recognize free human programmed death receptor-1 (PD-1) nor cemiplimab in complex with PD-1. The antibody can be used to measure free cemiplimab in patient samples.

The antibody is tagged with a SpyTag2 at the C-terminus of the Fab antibody heavy chain, enabling the user to couple it to a SpyCatcher reagent for conversion to alternative formats in less than one hour.

A pair of anti-cemiplimab antibodies can be used to develop a pharmacokinetic (PK) bridging assay to measure free drug. This antibody can be used as a capture reagent, paired with Anti-Cemiplimab Antibody, clone AbD41947ia ([HCA368](#)) in full IgG1 format as the detection reagent.

[View a summary of SpyCatcher products](#)

Cemiplimab (Libtayo) is a fully human IgG4/kappa antibody. It has been approved for the treatment of patients with metastatic cutaneous squamous cell carcinoma (CSCC) and for the first-line treatment of patients with advanced non-small cell lung cancer (NSCLC) whose tumours have high PD-L1 expression. Cemiplimab acts as a checkpoint inhibitor by binding to the PD-1 receptor and blocking its interaction with PD-L1 and PD-L2 ligands.

[View a summary of all anti-cemiplimab antibodies](#)

Affinity

The monovalent intrinsic affinity of AbD41947ad was measured as $K_D = 2$ nM by real time, label free molecular interaction analysis on immobilized cemiplimab.

ELISA

Clone AbD41947ad can be used as the capture antibody for cemiplimab in a bridging ELISA together with [HCA368](#) as the detection reagent.

Protocol: [PK bridging ELISA](#)

Storage

This product is shipped at ambient temperature. It is recommended to aliquot and store at -20°C on receipt. When thawed, aliquot the sample as needed. Keep aliquots at $2-8^{\circ}\text{C}$ for short term use (up to 4 weeks) and store the remaining aliquots at -20°C .

Avoid repeated freezing and thawing as this may denature the antibody. Storage in frost-free freezers is not recommended.

Guarantee

12 months from date of despatch

Acknowledgements

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ProClin is a trademark of The Dow Chemical Company ("Dow") or an affiliated company of

Dow.
His-tag is a registered trademark of EMD Biosciences.
Libtayo is a trademark of Regeneron Pharmaceuticals, Inc.

Health And Safety Information	Material Safety Datasheet documentation #20479 available at: 20479: https://www.bio-rad-antibodies.com/uploads/MSDS/20479.pdf
Licensed Use	For in vitro research purposes and for commercial applications for the provision of in vitro testing services to support preclinical and clinical drug development. Any re-sale in any form or any other commercial application needs a written agreement with Bio-Rad.
Regulatory	For research purposes only
Technical Advice	Recommended protocols for coupling a Fab antibody with a SpyTag to a SpyCatcher can be found at SpyTag and SpyCatcher Products , and further information about HuCAL recombinant antibody technology can be found in the HuCAL Antibodies Technical Manual

Related Products

Recommended Useful Reagents

[LYNX RAPID HRP ANTIBODY CONJUGATION KIT \(LNK002P\)](#)

[HISPEC ASSAY DILUENT \(BUF049A\)](#)

[SpyTag3 PEPTIDE \(BLP086\)](#)

[HUMAN ANTI CEMIPILIMAB \(HCA367\)](#)

[HUMAN ANTI CEMIPILIMAB \(HCA368\)](#)

[HUMAN ANTI CEMIPILIMAB \(HCA369\)](#)

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To find a batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets
'M417126:230302'

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